A Partnership Including Professional Corporations 1850 K Street, N.W. Washington, DC 20006-2296

202-887-8000

Facsimile 202-778-8087

**Boston** Chicago Los Angeles Miami Newport Beach New York Tallinn (Estonia)

Vilnius (Lithuania) Washington, D.C.

MCDERMOTT. WILL & EMERY

Including the practice formerly carried on by Lee, Toomey & Kent

Robert S. Schwartz Attorney at Law 202-778-8081

Associated (Independent) Offices

London **Paris** 

July 11, 1996

DOCKET FILE COPY ORIGINAL **RECEIVED** 

#### VIA HAND DELIVERY

William F. Caton, Secretary Federal Communications Commission 1919 M Street, N.W., Room 222 Washington, D.C. 20554

FEDERAL COMMUNICATIONS COMMISSION OFFICE OF SECRETARY

JUL 1 1 1996

MM Docket No. 87-268

Dear Mr. Caton:

Enclosed for filing are an original and eleven copies of the Comments of Circuit City Stores, Inc. filed in the abovereferenced docket.

An additional copy to be date stamped and returned with the messenger for our files is also enclosed.

Thank you for your assistance.

Sincerely yours,

Enclosures

\38074\011\FCCLTRRS.002

## DOCKET FILE COPY ORIGINAL

# Before the FEDERAL COMMUNICATIONS COMMISSION Washington, D.C. 20554

TECEIVED
DUL 1 1 1996
FEDERAL COMMUNICATIONS COMMISSION
OFFICE OF SECRETARY

In the Matter of

Advanced Television Systems and Their Impact Upon the Existing Television Broadcast Service

MM Docket No. 87-268

COMMENTS OF CIRCUIT CITY STORES, INC.

Richard L. Sharp Chairman, President and CEO

W. Stephen Cannon Senior Vice President and General Counsel

Circuit City Stores, Inc. 9950 Mayland Drive Richmond, VA 23233 (804) 527-4014

### TABLE OF CONTENTS

		Pa	ge	ž
SUMMARY .		•	•	ii
I.	SECTION 304 OF THE TELECOMMUNICATIONS ACT OF 1996 REQUIRES THE COMMISSION TO MAKE DEVICES USED TO ACCESS ANY SERVICE OF MULTICHANNEL VIDEO PROGRAM DISTRIBUTORS SUBJECT TO COMPETITIVE, UNBUNDLED MANUFACTURE AND SALE	•	•	4
II.	A COMPETITIVE MARKET IN ALL DEVICES RELEVANT TO DTV RECEPTION IS IMPORTANT FOR CONSUMERS AND IS NECESSARY TO COMMISSION IMPLEMENTATION OF SECTION 304 .	•	•	5
	A. Adoption of a standard for transmission of DTV signals is vital to maintaining a competitive national market in reception and other navigation devices		•	5
	B. The Commission has already determined that a standard for transmission of digital cable television signals is necessary		•	7
	C. To comply with section 304, and for sound policy reasons, the standards for DTV and digital cable television transmission must be compatible	•	•	8
III.	DTV ABILITY TO PROVIDE PROGRAMMING SUBJECT TO CONDITIONAL ACCESS MAY REQUIRE A STANDARD SECURITY INTERFACE TO ASSURE COMPETITIVE AVAILABILITY		•	9
IV.	TO COMPLY WITH THE OBJECTIVES OF SECTION 304, THE STANDARD SECURITY INTERFACE SHOULD NOT REQUIRE USE OF ANY DEVICES FURNISHED BY ANY SYSTEM OPERATOR .	•	•	12
CONCLUSION	v			13

#### SUMMARY

While it may be assumed that receivers for video and other services offered through a DTV standard will be subject to competitive manufacture and retail sale, this will be so only if the Commission takes care to assure this result. This outcome is required by section 304 of the Telecommunications Reform Act of 1996, which requires the Commission to assure the competitive availability of navigation devices for any service offered by a multichannel video programming distributor.

The Commission has declared its intention to adopt a standard for digital transmission of cable television services. Sound policy and the law require that a DTV transmission standard be compatible, to the greatest extent possible, with transmission standards for cable television and other competing services such as OVS. Similarly, with respect to conditional access, a common security interface for these services must be established so as to promote maximum feature and circuitry integration in consumer devices, yet allow system operators to retain any necessary control over security circuitry.

To achieve these ends and comply with section 304, further steps in this proceeding must be coordinated with implementation of section 304. Accordingly, it is necessary for proposed rulemaking pursuant to section 304 to be noticed and completed as expeditiously as is possible.

# Before the FEDERAL COMMUNICATIONS COMMISSION Washington, D.C. 20554

In the Matter of	)				
	)				
Advanced Television Systems		MM	Docket	No.	87-268
and Their Impact Upon the	)				
Existing Television Broadcast	)				
Service	)				

### COMMENTS OF CIRCUIT CITY STORES, INC.

Circuit City Stores, Inc. respectfully submits these comments in response to the Federal Communications

Commission ("FCC" or "Commission") May 20, 1996 Fifth

Further Notice of Proposed Rule Making in the above-captioned proceeding. 1/

circuit City supports the Commission's concern that sufficient attention be paid to national transmission standards with respect to DTV generally, and the concurrent establishment of compatible national standards for digital transmission of cable television signals. Only through such attention and action will there be established a national, competitive market in televisions, computer accessories, set-top boxes, and other navigation devices

Fifth Further Notice of Proposed Rule Making, MM Docket No. 87-268, FCC 96-207, released May 20, 1996 ("Notice").

<sup>2/</sup> Circuit City has no vested interest as to the particulars of such transmission standards and does not express a view in such respects.

that receive such signals, in accordance with section 304 of the Telecommunications Act of  $1996.3^{-1}$ 

As the nation's largest retailer of branded consumer electronics, Circuit City has a direct and immediate interest in competitive and unbundled markets for all of the devices that receive or otherwise process digital signals that are provided commercially to consumers' homes. 4/

Based in Richmond, Virginia, Circuit City has approximately 400 retail outlets nationwide. In its last fiscal year, Circuit City sold over \$7 billion in merchandise, more than 80 percent of which was branded in consumer electronics, including video, audio, telecommunications, and personal computer equipment. We sell, to the general public, America's major brands of personal computers, including Apple, AST, Compaq, Hewlett Packard, IBM, Packard Bell, and others.

To the extent that the Commission's Notice contemplates that broadcasters of advanced television will be offering multiple channels of audiovisual programming, some on a paid basis, 5/ they will become Multichannel Video Program

Distributors as defined in 47 U.S.C. § 522(12). This will

Telecommunications Act of 1996, Pub. L. No. 104-104,  $\S$  304.

Such products that enable receipt of any service offered by a distributor of multiple channels of audiovisual programming (see 47 U.S.C. § 522(12)) are referred to in section 304 as "navigation devices."

<sup>5/</sup> See Notice ¶¶ 15, 19, 28.

require, pursuant to section 304 of the 1996

Telecommunications Reform Act, that devices for receiving

these signals be available competitively, from manufacturers
and retailers independent of programming distributors.

Heretofore, there has not been any problem with competitive availability of broadcast reception devices.

The issues discussed in the Notice will determine whether this will continue to be so in the future:

- (1) If there is no national standard for transmission of DTV signals, can consumers expect a national, competitive market in navigation devices?
- (2) If there is no national standard for transmission of cable television signals, can compatibility between equipment used to receive cable signals and equipment used to receive DTV signals be assured?
- (3) Is it desirable that to the greatest possible extent, consumers be able to use the same devices for reception and conditional access processing of DTV, cable, DSS, OVS, and other broadband digital transmissions?

Circuit City urges the Commission to conclude that national and competitive markets for reception of DTV and digital cable signals cannot be assured unless transmission standards are set; and, if transmission and security interface standards are set, consumers can and should be able to use essentially the same devices for reception of these different digital media transmissions.

I. SECTION 304 OF THE TELECOMMUNICATIONS ACT OF 1996
REQUIRES THE COMMISSION TO MAKE DEVICES USED TO ACCESS
AMY SERVICE OF MULTICHAMNEL VIDEO PROGRAM DISTRIBUTORS
SUBJECT TO COMPETITIVE, UNBUNDLED MANUFACTURE AND SALE.

Section 304 of the 1996 Telecommunications Act mandates the "commercial availability ... of equipment used by consumers to access multichannel video programming and other services offered over multichannel video programming systems, from manufacturers, retailers, and other vendors not affiliated with any multichannel video programming distributor."

47 U.S.C. § 522(12) defines a "multichannel video programming distributor" as:

a person such as, but not limited to, a cable operator, a multichannel multipoint distribution service, a direct broadcast satellite service, or a television receive-only satellite program distributor, who makes available for purchase, by subscribers or customers, multiple channels of video programming.

Paragraphs 15, 19 and 28 of the Notice clearly contemplate that DTV providers may be offering multichannel video programming service for purchase by customers. Hence, DTV broadcasters will be covered by section 304 of the 1996 Act, which requires that all "navigation" devices for receiving any service offered by a multichannel distributor be available competitively, from manufacturers and retailers independent of programming distributors. As Circuit City has argued to the Commission in related proceedings, 5/

See filings by Circuit City of March 18 and April 17, 1996, in CS Docket No. 95-184 (Telecommunications Services (continued...)

transmission standards are a vital element of achieving competitive availability as required by section 304.

II. A COMPETITIVE MARKET IN ALL DEVICES RELEVANT TO DTV RECEPTION IS IMPORTANT FOR CONSUMERS AND IS NECESSARY TO COMMISSION IMPLEMENTATION OF SECTION 304.

In its Notice, the Commission seeks comments on the importance of standards to DTV transmission, in its own right (¶ 36) and with respect to compatibility with the transmission of cable television signals (¶ 64). Circuit City believes that, in each case, compatible transmission standards are necessary to ensure the competitive availability of reception and other navigation devices. This ought to be an appropriate goal in this proceeding even were it not compelled by section 304 of the 1996 Act.

A. Adoption of a standard for transmission of DTV signals is vital to maintaining a competitive national market in reception and other navigation devices.

In ¶ 36 of its Notice, the Commission cites the importance of transmission standards to over-the-air broadcast television, because "the American people rely [on broadcast television] for both information and entertainment," and because:

"[U]nlike these other services, free over-the-air broadcast television is a mass market media serving nearly all of the American public nationwide rather

<sup>6/(...</sup>continued)
Inside Wiring, Customer Premises Equipment) and July 5, 1996
in Docket 93-7 (Implementation of Section 17 of the Cable
Television Protection and Competition Act of 1992).

than a subscription service in which the service provider may supply the reception equipment.

Of course, once section 304 is implemented, other multichannel video program services will also need to be compatible with competitively procured equipment. But the Commission highlights the key point: If a service is to be offered to the public, and there is to be a national, competitive market in the equipment necessary to receive it, there needs to be a national transmission standard. This is so whether the transmission is delivered by terrestrial broadcast, satellite, or wire.

Circuit City sees nothing unique about terrestrial broadcasting in this respect. Congress has clearly stated that it favors competition in devices used to access broadband audiovisual programming, and that it favors giving customers the option of using a single competitively procured device to receive and process signals offered over competing media. The only way to achieve competition on a national basis, with the attendant benefits of scale and product integration, is (1) to have national transmission standards, and (2) to make the standards for different media as compatible technically as is possible.

<sup>2/</sup> See discussion below in II.C.

B. The Commission has already determined that a standard for transmission of digital cable television signals is necessary.

Even though cable television is not quite as universal as terrestrial broadcast, the Commission has already determined in Docket 93-7 that a single transmission standard is necessary. In its May 4, 1994 Report and Order, the Commission said:

[W]e find that standards for cable digital transmission are necessary to avoid future compatibility problems when cable systems use digital transmission methods, and to allow the mass production of economical consumer equipment that is compatible with cable digital services. In the latter regard, we believe that standardization is needed to ensure the establishment and effective operation of a competitive market in consumer hardware and software products for connection to digital cable service. 8/

It would be incongruous and irrational if, having determined that digital transmission standards are necessary for cable signals, which have never before been subject to transmission standards, the Commission were now to determine that digital transmissions of terrestrial broadcasts, which have always been subject to standards, were to be without them.

See In the Matter of Implementation of Section 17 of the Cable TV Consumer Protection and Competition Act of 1992: Compatibility Between Cable Systems and Consumer Electronics Equipment, First Report and Order, ET Docket No. 93-7 (rel. May 4, 1994), ¶ 143. This decision was confirmed upon reconsideration, and its relevance to this proceeding specifically noted. See Memorandum Opinion and Order, ET Docket 93-7 (rel. April 10, 1996), ¶ 3 and n. 9.

C. To comply with section 304, and for sound policy reasons, the standards for DTV and digital cable television transmission must be compatible.

The Commission seeks comment as to "whether the public interest would be served by Commission involvement to assure compatibility between digital broadcast standards and digital cable standards." It also asks whether such efforts should apply to other video delivery methods, such as DBS, MMDS, and OVS. Circuit City believes that it is a clear legal responsibility of the Commission to achieve the maximum possible degree of compatibility among transmission standards for such services.

In enacting section 304 of the 1996 Act, the Congress made clear that its interest in competitive availability extended to the potential use of consumer-procured products to gain access to, and hence choose among, a number of competing delivery services. The House Commerce Committee observed in its report:

Competition in the manufacturing and distribution of consumer devices has always led to innovation, lower prices and higher quality. Clearly, consumers will benefit from having more choices among telecommunications subscription services arriving by various distribution sources. A competitive market in navigation devices and equipment will allow common circuitry to be built into a single box or, eventually, into televisions, video recorders, etc. 10/

<sup>9/</sup> Notice, ¶ 64.

 $<sup>\</sup>frac{10}{}$  H.R. Rep. No. 204, 104th Cong., <u>1st</u> Sess. 112 ("House Report").

The Commission must achieve maximum compatibility among the transmission methods for the Multichannel Video
Distribution Systems mentioned in ¶ 64 in order to achieve this Congressional objective. Some services may be basically dissimilar in means of transmission, so will require some degree of conversion. But issues such as those referred to by the Commission in ¶ 64 should be resolved in favor of maximum commonality and compatibility among not only DTV and cable transmissions, but other Multichannel Video Program Distribution services as well.

III. DTV ABILITY TO PROVIDE PROGRAMMING SUBJECT TO CONDITIONAL ACCESS MAY REQUIRE A STANDARD SECURITY INTERFACE TO ASSURE COMPETITIVE AVAILABILITY.

The Commission states in ¶ 19 that DTV will support conditional access as to DTV signals. It also notes that "other services" may be distributed by DTV providers, and observes that "they can be received by a special-purpose decoder or, if specific services become popular, voluntary industry standards may be adopted and decoders may be built into some or all DTV receivers."

Section 304 of the 1996 Act applies to all services offered by Multichannel Video Program Distributors.

Accordingly, it would not be in conformance with the law if the Commission were to allow DTV signal providers to avoid competition for devices necessary to receive or assist in processing any video signals subject to conditional access encoding (which presently requires use of system-

operator-provided "set-top boxes"). Nor can the Commission allow a monopoly on operator-provided devices for access to the "other" services.

The specific requirements imposed by section 304 will be aired when the Commission notices its proceeding pursuant to that section. Its clear pertinence to this docket is an important reason for the Commission to move expeditiously to begin and complete that proceeding.

Even apart from the mandate under section 304, it is clearly sensible and possible to deal with conditional access for DTV video and other services, to the extent that specialized circuitry may be necessary, through a standard security interface. 11/2 In the digital signal environment, it is possible to place all security-related circuitry on a software carrier (e.g., a card). Security against theft of signal is actually improved, in this implementation, compared to security fixed in the box. 12/2 The only item over which the system operator could justifiably maintain a monopoly is the software carrier itself. Accordingly, to the extent that conditional access would require special

To the extent the implementation of conditional access in DTV may not require any specialized security hardware or software, so can be addressed through standard receiver circuitry, no interface may be necessary.

Encryption can be customized for small areas without any modification to the box, greatly diminishing the incentive to attack it. If the security is compromised,

circuitry for reception of DTV signals, the Commission needs only to:

- (a) define a standard interface for reading digital software carriers, and
- (b) require that with respect to any digital transmission of a signal by a system operator as to which security encoding is applied, the circuitry governing access must be furnished to subscribers by means of a software carrier compatible with the defined interface.

These tasks may be readily accomplished with existing technology and pending technical standards. Such means are discussed specifically in Circuit City's filings with respect to section 304. 13/ They need to be implemented by the Commission on a coordinated basis not only as to DTV and cable systems, but also with respect to the competing delivery systems, such as OVS, DBS, and MMDS, for consumers to the greatest extent possible to be able to use their own devices to choose among competing delivery systems, as Congress desires.

With respect to devices needed to access "other" services, the security interface concerns discussed above may or may not apply. Even if they do not, section 304 and sound policy require that competitive availability of the necessary navigation devices be achieved by the Commission. Again, this will require close and expeditious coordination as to this proceeding and implementation of section 304.

 $<sup>\</sup>frac{13}{}$  See note 6.

IV. TO COMPLY WITH THE OBJECTIVES OF SECTION 304, THE STANDARD SECURITY INTERFACE SHOULD NOT REQUIRE USE OF ANY DEVICES FURNISHED BY ANY SYSTEM OPERATOR.

Congress left no room or rationale in section 304 for the Commission to fashion any exception so as to allow system operators to provide any reception or other navigation devices exclusively, or to offer devices, with which others cannot compete, that integrate security functions with other features. To do so would flatly contradict the congressional intention to make all devices, except those strictly necessary for security, subject to competition.

It has generally been assumed that, since DTV is a broadcast medium, the necessary devices would follow the broadcast model of reception devices being available competitively at retail. Clearly, as it has applied to TVs, VCRs, computers, telephones, facsimile machines, etc., this model has produced breathtaking benefits of competition: reduced prices, higher quality, innovation, and integration of features. The same cannot be said of services as to which system providers have been exclusive distributors of reception equipment. It is up to the Commission, now, to assure that DTV follows the competitive model.

At the outset of the DTV service, particularly as provisions are made for conditional access and non-video services, the Commission should be sensitive to these competitive considerations, as well as to Congress's mandate. It should not and may not provide for any service

that would require a navigation device to be furnished other than under fully competitive circumstances that give consumers a choice among competing devices.

#### CONCLUSION

The main purpose of the Telecommunications Act of 1996 was to promote competition at every level of the telecommunications system. One of the few provisions, however, that offers direct choices to consumers is section 304, which requires that consumers have a choice of access devices for broadband services.

The Commission must preserve competition and consumer choice in this proceeding, not only in DTV but also in related and competing services. The capabilities and flexibility of the DTV standard under consideration underscore the need for the Commission to approach finalization with due regard for coordination as to other proceedings and services, including cable TV, OVS, and other broadband methods of signal delivery. This will require careful attention to the steps necessary to achieve retail availability of devices from competing manufacturers.

Respectfully submitted,

CIRCUIT CITY STORES, INC.

By:

Richard L. Sharp

Chairman, President

and CEO

W. Stephen/Cannon Senior Vice President and General Counsel

Circuit City Stores, Inc. 9950 Mayland Drive Richmond, VA 23233 (804) 527-4014

Dated: July 11, 1996